



7-16-04

JFW

EXPRESS MAIL LABEL NO.: EV 333 489 823 US

PATENT

Attorney Docket No. 29191-712.201

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application)	<u>PATENT APPLICATION</u>
)	
Inventor(s): Mikhail Belov et al.)	
)	Art Unit: 2881
Application No.: 10/810,332)	
)	Examiner: Unassigned
Filed: March 25, 2004)	
)	Confirmation No.: 8248
Title: A-Priori Biomarker Knowledge Based Mass)	
<u>Filtering for Enhanced Biomarker Detection</u>)	

Commissioner of Patents
P.O. Box 1450
Alexandria, VA 22313-1450

INFORMATION DISCLOSURE STATEMENT UNDER 37 C.F.R. §1.97

Sir:

Listed below or on an attached Form PTO-1449 is information known to applicant(s). A copy of each listed publication and U.S. and foreign patent, except for pending U.S. applications, is being submitted herewith, along with a concise explanation of information in a foreign language, if any, pursuant to 37 C.F.R. §1.97-1.98.

Applicants respectfully request that the listed information be considered by the Examiner and be made of record in the above-identified application. If form PTO-1449 is enclosed, the Examiner is requested to initial and return it in accordance with MPEP §609.

Applicant(s) reserve(s) the right to establish the patentability of the claimed invention over any of the information provided herewith, and/or to prove that this information may not be prior art, and/or to prove that this information may not be enabling for the teachings purportedly offered.

This statement is not intended to represent that a search has been made or that the information cited in the statement is, or is considered to be, material to patentability as defined in §1.56.

- ☒ This statement qualifies under 37 C.F.R. §1.97, subsection (b) because (check all that apply):
- ☒ (1) It is being filed within 3 months of the application filing date and is other than a continued prosecution application under § 1.53(d)
-- OR --
- ☐ (2) It is being filed within 3 months of entry of a national stage
-- OR --
- ☒ (3) It is being filed before the mail date of the first Office Action on the merits
-- OR --
- ☐ (4) It is being filed before the mailing of a first Office Action after the filing of a request for continued examination under § 1.114.
- ☐ 37 C.F.R. §1.97(c). If this statement is being filed after the latest of: (1) three months beyond the filing date of a national application; (2) three months beyond the date of entry of the national stage as set forth in §1.491 in an international application; or (3) the mailing date of a first Office action on the merits, but before the mailing date of the earlier of a final office action under §1.113 or a notice of allowance under §1.311, then:
- ☐ a certification as specified in §1.97(e) is provided below; **or**
- ☐ a fee of \$180.00 as set forth in §1.17(p) is authorized below, enclosed, or included with the payment of other papers filed together with this statement.
- ☐ 37 C.F.R. §1.97(d). If this statement is being filed after the mailing date of the earlier of a final office action under §1.113 or a notice of allowance under §1.311, but before payment of the issue fee, then:
- A. a certification as specified in §1.97(e) is completed below; and
- B. a petition under 37 C.F.R. §1.97(d) requesting consideration of this statement is submitted herewith; **and**
- C. a fee of \$130.00 as set forth in §1.17(i)(1) is authorized below, enclosed, or included with the payment of other papers filed together with this statement.
- ☐ Copies of each of the references listed on the attached Forms PTO-1449 are enclosed herewith. Due to the voluminous nature of the references, each reference is provided in PDF format on the attached CD ROM, clearly titled by publication number or author.
- ☒ Copies of references listed on the attached Form PTO-1449 are enclosed herewith EXCEPT THAT:
- ☐ In view of the voluminous nature of references, and the likelihood that these references are available to the Examiner in the file history of the parent application (Serial No.), copies are not enclosed herewith.
- ☐ If any of the foregoing publications are not available to the Examiner, Applicant will endeavor to supply copies at the Examiner's request.

- ☒ Copies of only foreign patent documents and non-patent literature are enclosed in accordance with 37 CFR 1.98 (a)(2). (The U.S. patents and each U.S. patent application publication listed on the attached Form PTO-1449 are not enclosed because this U.S. patent application was filed after June 30, 2003 or this international application has entered the national stage under 35 USC §371 after June 30, 2003 (see USPTO waiver of requirement under 37 CFR 1.98 (a)(2)(i)).
- ☒ There are no listed references which are not in the English language.
- ☐ The relevance of those listed references which are not in the English language is as follows:
- ☐ Attached are copies of search report(s) from corresponding patent application(s), which are listed on the attached Submission Under MPEP 609 D.
- ☐ Attached are the following non-published pending patent applications which may be deemed relevant, which are listed on the attached Submission Under MPEP 609 D.
- ☒ *Fee Authorization.* The Commissioner is hereby authorized to charge the above-referenced fees of \$0.00 and charge any additional fees or credit any overpayment associated with this communication to Deposit Account No. 23-2415 (Docket No. 29191-712.201).

Respectfully submitted,

WILSON SONSINI GOODRICH & ROSATI

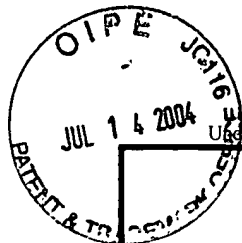
Dated: _____

7/13/04

By: _____

U.P. Peter Eng, Reg. No. 39,666

650 Page Mill Road
Palo Alto, CA 94304-1050
(650) 493-9300
Customer No. 021971

**TRANSMITTAL
FORM***(to be used for all correspondence after initial filing)*

TRANSMITTAL FORM <i>(to be used for all correspondence after initial filing)</i>	Application Number	10/810,332	
	Filing Date	March 25, 2004	
	First Named Inventor	Mikhail Belov et al.	
	Art Unit	2881	
	Examiner Name	Unassigned	
Total Number of Pages in This Submission		Attorney Docket Number	29191-712.201

ENCLOSURES (Check all that apply)

<input type="checkbox"/> Fee Transmittal Form	<input type="checkbox"/> Drawing(s)	<input type="checkbox"/> After Allowance communication to Technology Center (TC)
<input type="checkbox"/> Fee Attached	<input type="checkbox"/> Licensing-related Papers	<input type="checkbox"/> Appeal Communication to Board of Appeals and Interferences
<input type="checkbox"/> Amendment/Reply	<input type="checkbox"/> Petition	<input type="checkbox"/> Appeal Communication to TC (Appeal Notice, Brief, Reply Brief)
<input type="checkbox"/> After Final	<input type="checkbox"/> Petition to Convert to a Provisional Application	<input type="checkbox"/> Proprietary Information
<input type="checkbox"/> Affidavits/declaration(s)	<input type="checkbox"/> Power of Attorney, Revocation Change of Correspondence Address	<input type="checkbox"/> Status Letter
<input type="checkbox"/> Extension of Time Request	<input type="checkbox"/> Terminal Disclaimer	<input checked="" type="checkbox"/> Other Enclosure(s) (please identify below):
<input type="checkbox"/> Express Abandonment Request	<input type="checkbox"/> Request for Refund	Itemized return postcard,
<input checked="" type="checkbox"/> Information Disclosure Statement	<input type="checkbox"/> CD, Number of CD(s) 1	Printed copies (12) of non-patent references
<input type="checkbox"/> Certified Copy of Priority Document(s)	Remarks	
<input type="checkbox"/> Response to Missing Parts/Incomplete Application		
<input type="checkbox"/> Response to Missing Parts under 37 CFR 1.52 or 1.53		

SIGNATURE OF APPLICANT, ATTORNEY OR AGENT

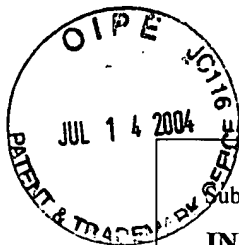
Firm or Individual name	U.P. Peter Eng, Reg. No. 39,666, WILSON SONSINI GOODRICH & ROSATI		
Signature			
Date	7/13/04		

CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being facsimile transmitted to the USPTO or deposited with the United States Postal Service with sufficient postage as Express mail (Label No. EV333489823US) in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on <u>July 14, 2004</u>			
Typed or printed name	Tami O'Bryant		
Signature		Date	July 14, 2004

This collection of information is required by 37 CFR 1.5. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.



Under the paperwork Reduction Act of 1995, no persons required to respond to a collection of information unless it contains a valid OMB control number.

INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Use as many sheets as necessary)				Complete if Known	
				Application Number	10/810,332
				Filing Date	March 25, 2004
				First Named Inventor	Mikhail Belov et al.
				Art Unit	2881
				Examiner Name	Unassigned
Sheet	1	of	2	Attorney Docket Number	29191-712.201

U.S. PATENT DOCUMENTS					
Examiner Initials*	Cite No. ¹	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
		US-4,977,320	12-11-1990	Chowdhury et al.	
		US-5,045,694	09-03-1991	Beavis et al.	
		US-5,245,186	09-14-1993	Chait et al.	
		US-5,396,065	03-07-1995	Myerholtz et al.	
		US-5,545,304	08-13-1996	Smith et al.	
		US-5,572,022	11-05-1996	Schwartz et al.	
		US-5,834,771	11-10-1998	Yoon et al.	
		US-5,917,185	06-29-1999	Yeung et al.	
		US-5,939,612	08-17-1999	Wylie et al.	
		US-5,994,695	11-30-1999	Young	
		US-6,075,244	06-13-2000	Baba et al.	
		US-6,091,502	07-18-2000	Weigl et al.	
		US-6,107,628	08-22-2000	Smith et al.	
		US-6,175,112-B1	01-16-2001	Karger et al.	
		US-6,207,954-B1	03-27-2001	Andrien, Jr. et al.	
		US-6,300,626-B1	10-09-2001	Brock et al.	
		US-6,305,975-B1	10-23-2001	Steiner	
		US-6,316,768-B1	11-13-2001	Rockwood et al.	
		US-6,369,383-B1	04-09-2002	Cornish et al.	
		US-6,465,776-B1	10-15-2002	Moini et al.	
		US-6,495,016-B1	12-17-2002	Nawracala	
		US-6,541,768-B2	04-01-2003	Andrien, Jr. et al.	
		US-6,614,020-B2	09-02-2003	Cornish	
		US-2002/0054289-A1	05-09-2002	Thibault et al.	
		US-2003/0034449-A1	02-20-2003	Miller et al.	
		US-2003/0052269-A1	03-20-2003	Apffel, Jr. et al.	
		US-2003/0071206-A1	04-17-2003	Belov et al.	
		US-2003/0146377-A1	08-07-2003	Miller et al.	
		US-2003/0146392-A1	08-07-2003	Kimmel et al.	
Examiner Signature				Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ¹Applicant's unique citation designation number (optional). ²See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. ³Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁴For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁵Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁶Applicant is to place a check mark here if English language Translation is attached.

Under the paperwork Reduction Act of 1995, no persons required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449/PTO INFORMATION DISCLOSURE STATEMENT BY APPLICANT <i>(Use as many sheets as necessary)</i>				Complete if Known	
				Application Number	10/810,332
				Filing Date	March 25, 2004
				First Named Inventor	Mikhail Belov et al.
				Art Unit	2881
				Examiner Name	Unassigned
Sheet	2	of	2	Attorney Docket Number	29191-712.201
NON PATENT LITERATURE DOCUMENTS					
Examiner Initials*	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.			T ²
		BROCK, Ansgar, et al., "Hadamard transform time-of-flight mass spectrometry". Anal. Chem. (1998) 70:3735-3741.			
		COVEY, Thomas R., et al., "Structural characterization of protein tryptic peptides liquid via chromatography/mass spectrometry and collision-induced dissociation of their doubly charged molecular ions". Anal. Chem. (1991), 63:1193-1200.			
		FERNANDEZ, Facundo M., et al., "Hadamard transform time-of-flight mass spectrometry: a high-speed detector for capillary-format separations". Analytical Chemistry (April 1, 2002), 74(7)1611-1617.			
		GEROMANOS, S. et al., "Tuning of an electrospray ionization source for maximum peptide-ion transmission into a mass spectrometer", Analytical Chemistry (2000), 72(4), 777-790.			
		MLYNSKI, V. et al., "Matrix-assisted laser/desorption ionization time-of-flight mass spectrometer with orthogonal acceleration geometry: preliminary results". Rapid Communications in Mass Spectrometry (1996) 10:1524-1530.			
		OTOF Description, Pacific Northwest Laboratory, printed from Internet 01/01/03 <<http://www.emsl.pnl.gov:2080/docs/msd/fticr/OTOF_Description.html>>.			
		SCHMITT-KOPPLIN, Philippe et al., "Capillary electrophoresis – mass spectrometry: 15 years of developments and applications", Electrophoresis (2003), 3837-3867.			
		SELBY, David S., et al., "Demonstrating the effect of the 'polarised grid geometry' for orthogonal acceleration time-of-flight mass spectrometers". Rapid Communications in Mass Spectrometry (2000) 14:616-617.			
		SHARARA, K., et al., "Development of membrane introduction mass spectrometry for monitoring trace organics in water". Water Science and Technology (2000) 41(10-11):373-380.			
		VESTAL, M., et al., "Resolution and mass accuracy in matrix-assisted laser desorption ionization-time-of-flight". J. Am. Soc. Mass Spectrom (1998), 9:892-911.			
		WILLIAMS, Jon D., et al., "Using accurate mass electrospray ionization-time-of-flight mass spectrometry with in-source collision-induced dissociation to sequence peptide mixtures". Journal of Chromatography A (2003) 1020:11-26.			
		ZARE, Richard N., et al., "Hadamard transform time-of-flight mass spectrometry: more signal, more of the time". Stanford University, Department of Chemistry, 28 pages.			
Examiner signature				Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹Applicant's unique citation designation number (optional). ²Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.